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Earthquake Shaking — Orange Alert

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PAGER
Version 5

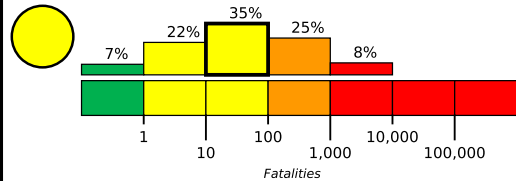# M 5.7, 6 km SW of Restrepo, Colombia

Origin Time: 2023-08-17 17:17:18 UTC (Thu 12:17:18 local)
Location: 4.2142° N 73.6065° W Depth: 7.9 km

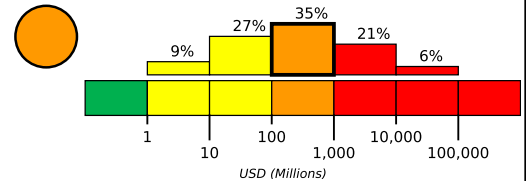Created: 1 day, 0 hours after earthquake

Estimated Fatalities

Orange alert for economic losses. Significant damage is likely and the disaster is potentially widespread. Estimated economic losses are less than 1% of GDP of Colombia. Past events with this alert level have required a regional or national level response.

Yellow alert for shaking-related fatalities. Some casualties are possible.
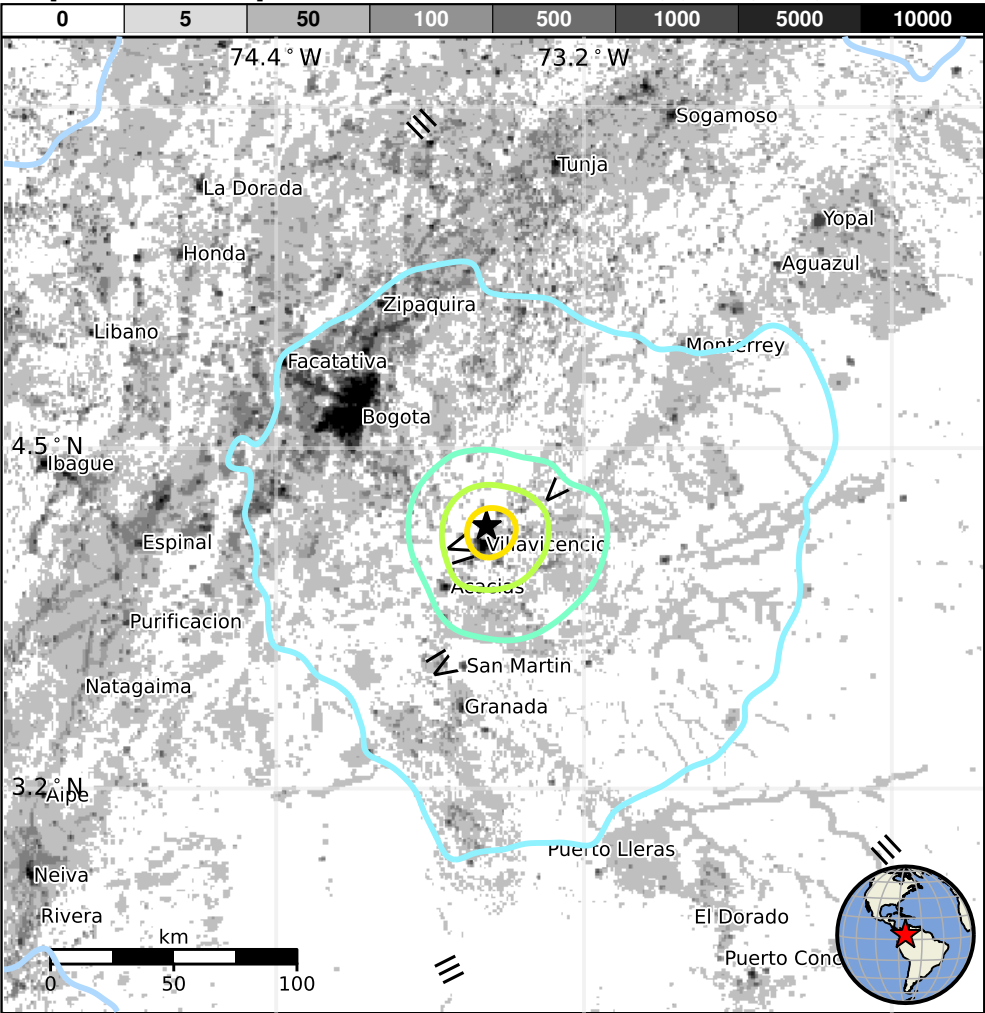
Estimated Economic Losses

Estimated Population Exposed to Earthquake Shaking

ESTIMATED POPULATION EXPOSURE (k=x1000)		–*	4,423k*	10,968k	116k	32k	487k	0	0	0
ESTIMATED MODIFIED MERCALLI INTENSITY		I	II-III	IV	V	VI	VII	VIII	IX	X+
PERCEIVED SHAKING		Not felt	Weak	Light	Moderate	Strong	Very Strong	Severe	Violent	Extreme
POTENTIAL DAMAGE	Resistant Structures	None	None	None	V. Light	Light	Moderate	Mod./Heavy	Heavy	V. Heavy
	Vulnerable Structures	None	None	None	Light	Moderate	Mod./Heavy	Heavy	V. Heavy	V. Heavy

*Estimated exposure only includes population within the map area.

Population Exposure

population per 1 sq. km from Landscan

0	5	50	100	500	1000	5000	10000

Structures

Overall, the population in this region resides in structures that are vulnerable to earthquake shaking, though resistant structures exist. The predominant vulnerable building types are mud wall with wood and unknown/miscellaneous types construction.

Historical Earthquakes

Date (UTC)	Dist. (km)	Mag.	Max MMI(#)	Shaking Deaths
1983-03-31	392	5.6	VII(47k)	241
1994-06-06	299	6.8	VIII(7k)	295
1999-01-25	231	6.1	VIII(27k)	1k

Recent earthquakes in this area have caused secondary hazards such as landslides that might have contributed to losses.

Selected City Exposure

from GeoNames.org

MMI	City	Population
VII	**Villavicencio**	**322k**
VII	Restrepo	8k
VI	Cumaral	11k
V	**Acacias**	**41k**
V	Guayabetal	2k
V	Quetame	1k
IV	**Bogota**	**7,674k**
III	**Tunja**	**117k**
III	Yopal	61k
III	**Ibague**	**422k**
III	**Neiva**	**353k**

bold cities appear on map. (k = x1000)

PAGER content is automatically generated, and only considers losses due to structural damage. Limitations of input data, shaking estimates, and loss models may add uncertainty.
https://earthquake.usgs.gov/earthquakes/eventpage/us7000kp2j#pager

Event ID: us7000kp2j